# Norm's Utility Contractor, Inc. Portable Hot-Mix Asphalt Plant Permit Application Grain Loading Standard

# Source Information

Manufacturer:	Cedarapids	190 W.C.
Model No:	8835	
Fuel:	Natural Gas	

# Dryer Data

PM Emission Rate: 5.75 lb/hr

# Exit/Flue Gas Flow Rate Calculation

ACFM*	52,800	acfm
Stack Temperature*	790.8	R
Stack Pressure*	30.3	inHg
Stack Moisture*	27.4	%
Exit flow rate: = ACFM(Std	T(°R)/Stack T(°	R)(Stack P (inHg)/Std P(inHg))((100-%H20)/100))
Exit flow rate: =	25,919	dscfm

Grain loading

Calculated: Natural Gas 0.03 gr/dscf NSPS Loading Standard [40 CFR 60.92(a)(1)]: 0.04 gr/dscf

Result:	Most the senie le	pading standard:	Yes
THE SECURE	meet the drain it	Jauino Stantoaro:	169 1

Supplied by Norm's Utility Inc.

# Norm's Utility Contractor, Inc. Portable Hot-Mix Asphalt Plant Permit Application Asphalt Storage Tank Heater Grain Loading Calculation

#### **Boiler Data**

Rated Heat Input: 2.115 MMBtu/hr
PM Emission Rate: 0.02 lb/hr
Fuel: Natural Gas

## Exit/Flue Gas Flowrate Calculaiton

Fd (Table 19.2 EPA Method 19) 8710 dscf/MMBtu
Exit flowrate @ 0% O2: 307.0 dscfm
Exit flowrate @ 3% O2: 358.5 dscfm

## Grain loading

Calculated:	0.005 gr/dscf
Loading Standard (IDAPA 58.01.01.675):	0.015 gr/dscf

Result: Meet the grain loading standard: Yes

Facility ID/AIRS No.	777-00372	Spreadsheet Date	3/13/2006 16:51	
Permit No.	P-060100	HMA Type: Drum Mix or Batch ? Include Silo Fill & Loadout Emissions	Drum Mix	
Facility Owner/Company Name:	Norm's Utility Contractor, Inc., Rathdrum, Portable HMA			
Address:	P.O. Box 2047			
City, State, Zip:	Coeur d'Alene, Idaho 83816			
Facility Contact	Tom Mattix			
Contact Number/ e-mail:	(208) 661-5076	32 - 1-May-200-000 - 00	0.700%	
is this HMA facility subject to NSPS7 Yes=1,No=0	1	Commenced Operations in:	1991	
Use Short Term Source Factor on 586 ELs? Y or N	N	Use STSF on 586 AACC? Y/N	N	
Hot Mix Plant AP-42 Section 11.1)	Input (Bold Color) or Calculated Value (Black)	Fuel Type(s)	Fuel Type Toggle ("0" or "1")	
Drum Dryer Make/Model	Cedarapids 8835	#2 Fuel Oil	0	
Rated heat input capacity, MMBtu/hr	88.2	Used Oil or RFO4 Oil	0	
Drum Dryer Hourly Throughput, Tons/hr	260	Natural Gas	1	
Hours of operation per day	24	LPG or Propane	0	
Hours of operation per year (*Throughput AnnualHourly)	8,760	Exit Gas Volume (acfm)	52,800	
Max Throughput at Annual Hours, Tons/yr	2,190,000	Exit Gas Temperature (°F)	331.13	
Max Throughput (Proposed Limit), T/yr	2,190,000	Stack Pressure (in Hg)	30.300	
		Stack Moisture Content, %	27.40	

Proposed hours per year = 2,800. Annual hours of operation based on max hourly and annual throughput is only 1,200

Rated heat input capacity (MMBtu)	2.115	Fuel Type(s)	Fuel Toggle
Hours of operation per day	24.00	#2 Fuel Oil	0
Operation, days per year	365	Used Oil	0
Hours of operation per year	8,760	Natural Gas	1
Exit Flow (acfm) or Velocity (fps) ACFM	850	Indirect Heat or Power? Y or N	N
Exhaust exit gas temperature (°F)	450		

Tank Heater Fuel Consumption	#2 Fuel Oil	Natural Gas
Heat Input Rating (MMBtu/hr)	2.115	2.115
Fuel Heating Value, Btu/gal (oil) or Btu/scf (gas)	139,000	1,050
Heating Value Correction for Natural Gas EFs, see Note	n/a	1.029
Theoretical Max Fuel Use Rate gal/hr (oil) or sof/hr [gas]	15.22	2,014
Max Operational Hours per Year (Proposed Limit)	8,760	8,760

	Fuel Type(s)	Fuel Toggle
Make/Model	#2 Fuel Oil (Diesel)	0
xxx kW	Gasoline	0
0	Use EFs in lb/MMBtu	0
320	Max Fuel Use Rate, gal/hr	23
429	Fuel Heating Value, Btu/gsl	137,030
	Calculated MMBtu/hr	3.1517
0	Max Operational Hours/Day	0
ň	Max Operational Hours/Year	0
	xxx kW 0 320	Make/Model #2 Fuel Oil (Diesel) xxx kW Gasoline 0 Use EFs in Ib/MMBtu 320 Max Fuel Use Rate, gal/hr 429 Fuel Heating Value, Btu/gal Calculated MMBtu/hr 0 Max Operational Hours/Day

			Fuel Type(s)	Fuel Toggle
	Generator Make/Model	Make/Model	#2 Fuel Oil (Diesel)	0
		xxx kW	Dual Fuel (diesel/natural gas)	0
FUEL OPTIONS:	#2 Fuel Oil (Diesel)	12.50	Natural Gas Fuel	
M	ax Sulfur weight percent (w/o)	0.5	Max Sulfur w/o	0.5
	Mex Fuel Use Rate, gal/hr	54.81	Max Fuel Use Rate, scf/hr	1000.0
	Fuel Heating Value, Btu/gal	137,030	Fuel Heating Value, Btu/scf	1,020
Au 22	Calculated MM8tu/hr	7.51	Calculated MMBtu/hr	1.020
M	ax Operational Hours per Day	24	Max Operational Hours per Day	0
Mi	x Operational Hours per Year	5,314	Max Operational Hours per Year	5.314

Note: AP-42 Table 3.4-1 EFs presume dual fuel operation of 5% diesel and 95% natural gas.	
Note: AP-42 Tables 3.3-x,3.4-x: avg diesel heating value assumed 19,300 Btu/b with density equal 7.1 lb/gal=> Btu/gal =	137,030

HMA Drum Mix Fabric Filter Toolkit\_B1-Facility Data Input\_Version C\_02/17/2006 Page 1

Facility:

Norm's Utility Contractor, Inc, Rathdrum, Portable HMA

SB, App. B- UNCONTROLLED

3/13/2006 17:18

Permit/Facility ID:

P-060100 777-00372

#### Tier I Applicability Determination (Major Source as defined in IDAPA 58.01.01.008)

Hourly Throughput Annual Hours Operating

8,760 hrs/yr

Max Annual Throughput

2,190,000 Tonslyr (Theoretical Maximum HMA at Max. Annual Operating Hours)

2,190,000 Tons/yr (Proposed HMA Throughput Limit) Max Annual Throughput

Potential to Emit (PTE)1: The maximum capacity of a facility to emit an air pollutant under its physical and operational design. Any physical or operational limitation on the capacity of the facility to emit an air pollutant, provided the limitation or its effect on emissions is state or federally enforceable, shall be treated as part of its design. Limitations may include, but are not limited to, air pollution control equipment and restrictions on hours of operation or on the type or amount of materials combusted, stored, or processed. [58 01.01.006.72)

# Annual Emissions of CAA Title V Hazardous Air Pollutants<sup>3</sup> (total PTE from HMA facility)

IDAPA 58.01.01.xx	Pollutant	Tier I Major Source Definition (T/yr)	PTE Maximum T/yr
006.10.a	Emit any HAP* >	10	3.40
006.10.a	Emit total HAPs <sup>5</sup> >	25	6.01

<sup>&</sup>lt;sup>3</sup> Per 58.01.01.008 10.a: HAPs are defined as pollutants listed pursuant to 42 U.S.C. 7412(b), i.e., the initial list of 100 HAPs

### Annual Emissions of CAA Title V Regulated Pollutants (total PTE from HMA facility)

IDAPA 58.01.01.xx	Pollutant	Tier I Major Source Definition (T/yr)	PTE Maximum T/yr
006.82 C	PM (total)	100	30660.1
006.82 b, c	PM-10 (total)	100	7117.6
008.82 b, c	PM-2.5 (total)	100	3.18
006,82.a, b	co	100	143.1
005.82.a, b	NOx	100	29.4
008.82. b	SO <sub>2</sub>	100	3.7
006.82 b	Ozone (VOCs)	100	35.1
006.82 b	Lead	100	6.83E-04

<sup>6</sup> Emissions without Limits - emissions without physical or operational limits (i.e., who baghouse for drum dryer, operate as continuous process 8760 hrs/yr) FOR NORM's HMA: Worksheets for drum dryer emissions using natural gas fuel use EFs for fabric filter for PM, PM10. Estimate uncontrolled emissions by multiplying drum dryer bahr from B4&5-MaxControlledEmissions by Uncontrolled EF/Controlled EF for PM and PM10 Uncontrolled PM = 28, Fabric Filter PM EF = 0.033 Uncontrolled PM10 = 6.5, Fabric Filter PM10 EF = 0.023

Drum Dryer PTE in lb/hr x ( 8,780 hrs/yr)/(2000 lb/T)(28/0 033) + Tank Heater PTE in lb/hr x (8760/2000) '+ Generator PTE in lb/hr x (8760/2000)

006.62.a: NOx and VOCx

006 82 b: NAAQS pollutants

006.82 c. Pollutant subject to standard under 42 U.S.C. 7411 (NSPS). (For HMAs subject to NSPS, this includes only PM)

006 82 d. Class I or Class II substance subject to standard under 42 USC 7671a(a) or 7671a(b) [Ozone-Depteting Substances]

Class I: CFC-11, 12, 13, 111, 112, 113, 114, 115, 211 twu 217, Helon 1211, 1301, 2402, carbon tetrachloride, methyl chloroform Class II: HCFC-21, 22, 31, 121 thru 124, 131, 132, 133, 141, 142, 221 thru 225, 231 thru 235, 241 thru 244, 251, 252, 253, 261, 262, 271 005 82 e. Pollutant subject to standard under 42 USC 7412 (HAPs).

including 7412(g) [Title V MACT, including (g)(2) which includes only pollutants subject to the MACT],

(i) [Title V "MACT" emission limit from State or EPA, case-by-case basis where MACT std not yet promugated], and

(r) [RMP, where regulated substances are listed in 40 CFR 68.130]

HMA Drum Mx Fabric Filter Toolkit\_B2-Tier I Applicability (PTE)\_Version C\_02/17/2006 Page 2

PTE includes emissions from point sources, as applicable (drum dryer, tank heater, and generator). Fugitive emissions are NOT included.

Screened using worksheet function seeking max loftir for any HAP from B485 Max Controlled Emissions (TPY)

<sup>5</sup> Total HAPs (T/yr) from B4&5 Max Controlled Emissions (TPY)

Ozone formation is estimated based on emissions of VOCs, which are in turn often estimated by presuming all TOC emissions are VOCs.

SB, App. B - UNCONTROLLED

3/13/2006 17:02

Permit/Facility ID:

P-060100 777-00372 POTENTIAL TO EMIT

Maximum Controlled Emissions of Any Pollutant from Drum Mix HMA Plant with Fabric Filter, Tank Heater, Generator, Load-out/Silo/Asphalt Storz

A, Drum Mix Plant 250 Tonshour 8,740 Hoursyear 2,190,000 Tonsyear HMA throughpur 24 his/day

Maximum emission for each pollutant from many fuel-burning oppons selected on "Facility Data" worksheet Fuels Selected = Natural Gas

8. Tank Heater: 2.1150 MMBtu Rat 8,740 Hoursyear 1,000 Facility Data" worksheet Fuels Selected = Natural Gas

8. Tank must emission for each pollutant for heater burning any fuel selected on "Facility Data" worksheet. Fuels Selected = Natural Gas

9. Tank Heater: 0.0 online of the Selected on "Facility Data" worksheet. Fuels Selected = Natural Gas

10. Cleanarater 10. Online of the Selected on Tanksheet. Fuels Selected = Natural Gas

11. Tank Heater: 0.0 online of the Selected on Tanksheet. Fuels Selected = Natural Gas

Pollutant	A Drum Mix Max Emission Rate for Pollutant (Tryr)	Aaphalt Tank Heater Max Emission Rate for Pollutant (T/yr)	C Generator Max Emission Rate for Pollutant (T/yr)	D Lead- out, Silo Filling, & Tank Storage Emission Rate for Pollutant (Tiyr)	E TOTAL of Max Emission Rates from A, B, & C (T/yr) Exclude Fugitives from D	Pollutant	A Drum Mix Max Emission Rate for Pollutant (Tryr)	B Asphalt Tank Heater Max Emission Rate for Pollutant (T/yr)	C Generator Max Emission Rate for Pollutant (T/yr)	D Load- out, Sile Filling, & Tank Storage Emission Rate for Pollutant (T/yr)	E TOTAL of Max Emission Rates from A. B. & C. (TAyr.) Exclude Fugitives from D.
PM (total)	30660.00	6.908-02	0.00E+00	5.72E-01	30580.07	PAH HAPs		3			
PM-10 (total)	7117.50		0.00E+00		7117.57	2-Methylnaphthalene	8.10E-02	2.18E-07	0.00E+00	2.35E-02	8 10E-0
PM-25	3.18	0.00E+00			3.18	3-Methylchloranthrene*	0.00E+00		0.00E+00		1.63E-0
CO	142.35	7.63E-01		1.48E+00		Acenaphthene	1.53E-03		0.00E+00		1,53€-0
NOx	28.47	9.08E-01			29.38	Acenaphthylene	9.42E-03				
SO <sub>1</sub>	3.72	5.45E-03			3.73	Anthracene	2.41E-04				
voc	35.04	5.00E-02		1.76E-01	35.09	Benzo(a)anthracener	2.30E-04		0 00E+00		
Lead	5.79E-04	4.54E-05			6.83E-04	Benzo(a)cyrene	1.07E-05		0.00E+00		1.07E-0
HCI	0.00E+00	0.00E+00	0.00E+00		0.00E+00	Benzo(b)Augranthener	1.10E-04		0.00E+00		
Dioxins*						Benzo(e)pyrene	1.20E-04		0.00E+00		
2,3.7,8-TCDO	0.00E+00	0.00E+00			0.00E+00	Benzo(g,h,l)perylene	4.38E-05		0.00E+00		
Total TCDD	0.00E+00	0.00E+00		-	0.00E+00	Benzo(k)fluoranthena*	4 49E-05		0.00E+00		4.49E-0
1,2,3,7,8-PeCDD	0.00E+00	0.00E+00			0.00E+00	Chrysene'	1.97E-04	1.63E-08	0.00E+00		
Total PeCDD	0.00E+00				0.00€+00	Dibenzo(a.h)anthracene		1.09E-08	0.00E+00		
1.2.3.4.7,8+tvCDD	0.00E+00				0.00E+00	Dichierobenzene	0.00E+00				1.09E-0
1,2,3,6,7,8-HsC00		0.00E+00			0.00E+00	Flucranthene	6.65E-04		0.00E+00		
1,2,3,7,8,9-HsCDD		0.00E+00			0.00€+00	Flucrene	4.16E-03	2.54E-08	0.00E+00		
Total HxCDD	0.00E+00				0.00E+00	Indeno(1,2,3-cd)pyrene		3.43E-08	0.00E+00		
1,2,3,4,6,7,8-Hp-CDO Total HpCDD		0.00E+00			0.00E+00	Naphthalene*	9.86E-02	5.54E-06	0.00E+00		
Octa CDD	0.00E+00				0.00E+00	Perylene Phenanthrene	9.64E-05	0.00E+00	0.00E+00		
Total PCOD"	0.00E+00				0.00E+00		5.91E-04	1.54E-07 4.54E-08	0.00E+00		
Furans*	0.005-00	U.OUEYBO	0.000,100		O DOC+DO	Pyrene		4.545-68	0.00E+00	1.78E-03	5.91E-0
2.3.7.6-TCDF	0.00E+00	0.00E+00	0.00E+00		0.00E+00	Non-HAP Organic Com Acetone*	D OGE+00	A 200 A0	A 405 40	0.480.04	
Total TCDF	0.00E+00	0.00E+00		2000000000	0.00E+00	Benzal dehyde	B ODE+OD	0.00E+00 0.00E+00	0.00E+00		0.00E+0
1.2.3.7.8-PeCDF	0.00E+00	0.00E+00			0.00E+00	Butane	7.34E-01	1.91E-02	0.00E+00		7.53E-0
2,3,4,7,8-PeCDF	0.00E+00	0.00E+00			0.00€+00	Butyraldehyde	0.00E+00				0 C0E+0
Total PeCDF	0.00€+00	0.00E+00	0.00E+00		0.006+00	Crotonaldehyde*	0.00E+00	0.00E+00	0.00E+00		0.00E+0
1,2,3,4,7,6-HxCDF		0.00E+00		100	0.00€+00	Ethylene	7.67E+00	0.00E+00	0.00E+03		7.67E+0
1,2,3,6,7,8-HxCDF		0.00€+00			0.00E+00	Heptane	1.03E+01	0.00E+00	0.00€+00		1.03E+0
2.3.4,6,7,8-HxCDF		0.00E+00			0.00E+00	Hexanal	0.00E+00	0.00E+00	0,00€+00		0.00E+0
1,2,3,7,8,9-HxCDF	0.00E+00				0.00E+00	isovaleraldehyde	0.00E+00		0.00E+00		0.00E+0
Total HwCDF		0.00E+00			0.00E+00	2-Methyl-1-pentane	4.38E+00		0.00E+00		4.38E+0
1.2.3.4.6.7.8-HpCOF 1.2.3.4.7.6.9-HpCOF	0.00E+00			_	0.00E+00	2-Methyl-2-butene	6.35E-C1		0.006[+00		6.35E-0
Total HpCDF	0.00E+00		0.00E+00		0.00E+00	3-Methylpertane 1-Pentane	2 08E-01		0.00E+00 0.00E+00		2.08E-0
Octa CDF	0.00E+00				0.00E+00	n-Pentaner	2.41E+00 2.30E-01	0.00€+00 0.00€+00	0.00E+00		2.41E+0 2.30E-0
Total PCDF		0.00E+00		7	0.00E+00	Valeraideltyde*	0.00E+00	0.000+00	0.00€+00	-	0.00E+0
Total PCDD/PCDF*	0.00E+00				0.00E+00	Wetals	1000-00	9.54E+00	0.000.00	-	2.002.0
Non-PAH HAPs		1.445.40	0.012.700		0.002.00	Antimory*	1.97E-04	0.00E+00	0.005+00	-	1.97E-0
Acetaidehyda'	0.00E+00	0.00E+00	0.00E+00		0.00E+00	Arsenc"	6.13E-04	1.82E-08	0.00E+00		6 15E-0
Acrolein*		0.00E+00			0.00E+00	Benun*	6.35E-03	4.00E-05	0.00E+00		6 39E-0
Bonzene*	4.27E-01			6.64E-03	4.27E-01	Bery lium*	0.00E+00	1.09E-07	0.00E+00		1.09E-0
1.3-Butacione*		0.00E+00		3-34E-33	0.00E+00	Cadmium*	4.49E-04	9 99E-06	0.00E+00		4.59E-0
Ethylbenzene*	2.636-01			3.91E-02	2.63E-01	Chromium*	6.02E-03	1.27E-05	0.00E+00		6 04E-0
Formal dehyde*	3.39E+00			9.61E-02	3.40E+00	Cobat*	2.85E-05	7,638-07	0.00E+00		2.92E-0
Hexane*	1.01E+C0			2010-46	1.02E+00	Copper	3.39E-03	7.72E-08	0.00E+00		3.40E-0
soctane	4.38E-02	0.00E+00		1.23E-04	4.38E-02	Hexavalent Chromium*	4.93E-04	0.00E+00	0.00E+00		4 93E-0
Methyl Ethyl Ketone*	0.00E+00	0.00E+00		7 44E-03	0.000=00	Manganese*	8.43E-03	0.00E+00	0.00E+00		8 436-0
Perkane*	0.00E+00	2.36E-02	0.00E+00		2 38E-02	Mercury	2.63E-04	0.00E+00	0.00E+00		2 836-0
Propionaldehyde*	0.00E+00				0.00E+00	Molybdenum*	0.00E+00	9.99E-06	0.00E+00		9.996-0
Quinone*	0.00E+00	0.00E+00	0.00E+00		0.00E+00	Nickel*	6.90E-02	0.00E+00	0.00E+00		6 90E-0
Methyl chigraform*	5.26E-02	0.00E+00	0.00E+00	0.00E+00	5.28E-02	Phosphorus*	3.07E-02	0.00E+00	0.00E+00		3.07E-0
Toluene*	1.64E-01	3.09E-05	0.00E+00	1.78E-02	1.64E-01	Sever"	5.26E-04	0.00E+00	0.00E+00		
Cylene*		0.00E+00	0.00E+00	6 88E-02	2.195-01	Selen um*	3.83E-04	0.00E+00	0.00E+00		5.26E-0
TOTAL PAH HAPs (Tiy		2 SUL 750	C 1005, 100	0.000-02	2.06E-01	Thatem"	4.49E-06		0.00E+00	-	3.636.04
TOTAL Federal HAPs (					6.01E+00	Vanadium*	0.00E+00	0.00E+00 2.09E-05	0.00E+00		4.49E-0
TOTAL Idaho TAPs (TA		_	The second secon		0.012740	Zno*	A COLUMN	S. O.SE - 0.2	0.006+00		2.09E-0

e) IDAPA Toxic Air Pollulant

HMA Drum Mix Fabric Filter Toolkit\_B4&5-Max Unontrolled Emis TPY\_Version B\_02/10/2006 Pages 4.5

Facility: Norm's Utility Contractor, Inc., Rathdrum, Portable HMA App.B - UNCONTROLLED

3/13/2006 17:02 Permit/Facility ID: P-060100 777-00372

age Max Emissions of Any Pollutant from Drum Mix HMA Plant: Fabric Filter, Tank Heater, Generator, Load-out/Silo/Asphalk Storage
A, Drum Mix Plant: 250 Tonshour 8,760 Houstylesr
Mixemum emission for each pollutant from any Nati-burning option selected. Fuel's Selected - 2,190,000 Tonshour HMA (https://portable.com/pollutant from any National Gas

1. Tank Heater: 2.1150 MNBtu Rated 8,760 Houstylesr
Mixemum emission for each pollutant from any National Gas
C. Generator: 0 pai/mour 0 Houstylesr
No Generator 42 Fuel Oil Generator 24 heated 24 heated 25 fuel's Selected 25 fuel's Selected 26 fuel's Selected 26 fuel's Selected 26 fuel's Selected 27 fuel's Selected 28 fuel's Selected 29 fuel's Selected 2

C. Generator:		0 gal/hour	0	Hours/year	No Generator
Pollubini	A Drum Mix Max Emission Rate for Pollutant (T/yr)	B Asphalt Tank Heater Max Emission Rate for Pollutant (T/yr)	C Generator Max Emission Rate for Pollutant (T/yr)	D Lead-out, Silo Filling, & Tank Storage Emission Rate for Pollutant (Tryr)	E TOTAL of Max Emission Retes from A, B, & C (T/yr) Exclude Fugitives from 0
non-PAH HAPs*					110%
Bromomethane*			3	6.80E-04	0.00E+00
2-Butanone (see Methyl Ethyl Ketone)					0.00E+00
Carbon disulfide*			9	1.32E-03	0.00E+00
Chloroethane (Ethyl shlonde*)	250		i literati	1.92E-04	0.00E+00
Chloromethane (Methyl chloride*)	000,00		6	1.73E-03	0.00E+00
Cumens				5.01E-03	0.00E+00
n-Hexane			8 30	0.00E+00	0.00E+00
Methylene chloride (Dichlarametheria*)			7855	1.23E-05	0.00E+00
MTBE				0.00E+00	0.00E+00
Styrene*				5.78E-04	0.00E+00
Tetrachioroethene (Tetrachioroethylene*)				3.51E-04	0.00E+00
1,1,1-Trichloroethane (Methyl chloroform)		12		0.00E+00	0.00E+00
Trichlorgethene (Trichlorgethylane*)				0.00E+00	0.00E+00
Trichiorofluoromethane			7	5.92E-05	0.00E+00
m-lp-Xylane*				2.78E-02	
o-Xylane*				3.90E-02	0.00E+00
Phena <sup>(*)</sup>		1		4.41E-03	0.00E+00
Non-HAP Organia Compounds	-	-		1.48E+00	0.00E+00
Methane	_			1.488+00	0,005,400

e) IDAPA Toxic Air Pollutant

Facility:

Norm's Utility Contractor, Inc., Rathdrum, Portable HMA

SB, AppB - UNCONTROLLED

3/13/2006 17:31

PermitiFacility ID: P-060100 777-00372

TAPs EL Screening

Max Emissions of Any Pollutant from Drum Nix HMA Plant with Fabric Filter, Tank Hester, Generator, Load-out/Sid Sphalt Storage
A. Drum Nik Plant: 259 Torishour 6.196 Hourspear 2,190,360 Torishear Hamble Storage
Maximum emission for each pollutant from any tuel-our ing opion selected on "Facility Osta" workshoot
B. Tank Heater: D. 1,195 NMDs Rated
Maximum emission for each pollutant for heater duming any fuel selected on "Facility Osta" workshoot
Maximum emission for each pollutant for heater duming any fuel selected on "Facility Osta" workshoot
G. Generator: O galbour D Maurityser Small or Large Generator valor D Acadis St

D. Include all emissions from Load-out/Silo Filling? Short Term Source Factor 586 ELs?

Yes

Polulant	TOTAL of Max Emission Rates from A, B. C & D (Exht)	Erment Little	TAPs Emissions Exceed EL Increment?		Pollutant	TOTAL of Max Emission Rates from A, B, C & D (Ib/Iv)	TAPs Screening Emission Limit (EL) increment <sup>3</sup> (bill)	TAPs Enteriors Exceed El. Increment?	Modeled?
			9 1111	2	PAH HAPs		CONTRACTOR OF THE PARTY OF THE	100	
			2021		z-Muthylnughthaliene	2.39E-02	19.00		
					3-Meltryl chloramhrene*	3.738-09	2.50E-06	No	No
	77			377.	Acenaphthene	8 TOE-04			-
4000		U CAMPA			Acensphilistens	2.18E-03	_		_
	= 300	3			Anthracene	1.97E-04		-	
- 2000			1970		Benzo(s)enthrasene	1.04E-04		-	
Sanda areas					Benzo(a)syrene*	4 41E-05	2.00E-06	Exceeds	See POM
ICI.	0.00	0.05	No		Benzo(b)Nuoranthene	3.15E-05	1000000	-	_
Dioxins"	.000000000	Toxio Equivalency Factor*	Adjusted Emission Rate (b/hr)		Bergojejpyrene	4.02E-05	122585		
3.7.8-7000	0.00€+00	1.0	0.00E+00		Berzolg 1 (pervione	1.16E-05	-		
Total TCOD	0.00E+00	759			Benzeikiffuoranthene	1.21E-06			170
2,3,7,8-PeCDO	0.006+00	0.5	0.00E+00	ST S	Chrysene	2.66E.04	7.5	-	
rotal PeCOD	0.00E+00	r/a		7,500	Dibenzo(a,h)anthracene	3.18E-07		200	
2,3,4.7,8 HxC00	0.008+00	0.1	0.00E+00	500000000000000000000000000000000000000	Dichi probenzene	2.49E-06			15.00
1,2,3,6,7,6 H+CDD	0.005+00	0.1	0.00E+00		Fluoranthena	2.90E-04		100000	
2.3,7,8,9-H#CDD	0.00E+00	0.1	0.00E+00		Pluorene	2 256-03			
Total HxGDD	0.00E+00	n/a			Indenni's 2.3-cd)pyrene	2.158-06			
2.3,4,6,7,8-Hp-CDD	0.00E+00	0.01	D.00E+00		Naphthalene*	2.478.02	2.33	No	No.
Foral HpCDO	D 00E+00	0/4		()	Perytene Phananthrene	4 00E-05 3.73E-03	-		-
Data CDD Total PCDD*	0.00E+00	nla				5.42E-04	+		-
	0.00E+00	nia	-	-	Pyrene Pyrene	4.21E-04	2 025 00	Esceeds	VES
Furens'	D DOER+CD	0.1	0.00E+00	-	Polycyclic Organic Matter**	4.215:04	2.026-00	Escheda	1.64
2 3, F, B-TGDF Total TGDF	0.00E+00	nia	2.002+00	1 777	Non-HAP Organic Compounds		_		
12.3.7.8-PeCDF	0.00E+00	0.05	0.00E+00		Acrone"	2.16E-03	119	No	No
2.3.4.7.8-PeCDF	0.00E+00	0.5	0.4DE+00	CHARLE S	Benzaldehyde	0.00E+00	1		
Total PeCDF	0.09€+00	N/B	100	- No. 100	Butare	1.72E-01		-	
1,2,3,4,7,8-HxCDF	0.06€+00	0.1	0.005+00		Butyraideflyde	D.00E+00			
1,2,3,0,7,8-HxCDF	0.00E+00	0.1	0-00E+00		Cretonaldefyde*	0.00E+00 1.79E+00	0.38	No	No
2.3.4.8.7.6-HeCDF	0.00E+00	0.1	0.00E+00		Etrylens	2.35E+00	109	No	No
1,2,3,7,8,9-HeCDF Total HyCDF	0.005+00	n/a	0.00E+00		Heptare Hexanal	0.00€+00		1	
1,2,3,4,8,7,8HpCDF	0.002+00	0.01	0.00E+00		Isovaleraldehyde	0.00E+00			
1.2.3.4.7.8.9-HpCDF	0.00E+00	0.01	0.000+00		2-Nethyl-1-pontene	1.006+00			-
Total HpCDF	6.00E+00				2-Methyl-2-butene	1.45E-01	-		
Octa CDF	0.00E+00		-		3-Methylpentane	4,75E-02	1	-	
Tetal PCOF	0.00E+00				t-Pertene n-Pertane*	5.50E-01 5.25E-02	116	No	No
TOTAL	Adjusted lafer	TAPs EL for 2.3.7.8 TODD	Exceeds TAPs EL?	Nodeled?	Valeraidehyde (n-Valeraidehyde*		11.7	1000	No
Dioxin/Furans	-	ACCUPATION AND ADDRESS OF THE PARTY OF THE P	No		Netals	0.002.00	-		-
	U/VUE*00	TAPs EL	140	-	Animony"	4 S0E-05	0.033	No.	No
Nen-PAH HAPs Acetaldehyde*	0.005+00	3.00E-03	No		Arsenio*	1.40E-04	1.50E-06		YES
Acrolein*	0.036+00		No		Saturn'	1.48E-03	0.033		Na
Benzene*	9.90E-02		Exceeds	YES	Beylium*	2.49E-08	2.80E-05		No
1.3-Butadiane*	-			7	Catimium*	1.05E-04	3.70E-00		YEB
Ethylpenzene*	6.89E-02	29	No		Chromun*	1.38E-03	0.030	No	Ma
Formaldehyde*	7.07E-01	5.10E-04	Exceets	YES	Cotat*	6.67E-08	0.0033	No	, No
Hexane*	2.348-01	12	No		Copper*	7.77E-04	0.013		N-2
sociare	1.00E-02	1		37	Hexavalent Chromium*	1.136-04	5.60E-07		YES
Methyl Ethyl Kelone*	1.70E-03	39.3	No		Manganeso*	1.93E-03	0.067		No
Pentane*	5.39E-03	111	No	- 0	Mercury*	6 00E-05	0.000		No
Propionaldery de*	0.00€+00	0.0287	No		Molytdenum"	2.286-05	0.333		No.
Quinena*	0.00E+C0		No	0.00	Nesel*	1.56E-02	2 706-05		YES
Methyl chloroform*	1.20E-02	127	No		Phosphorus*	7.00E-03	9 907		No
Takene*	4.56E-02	25	No		Silver*	1.20E-04	0.007		No
Xylene	6.53E-02	29	No	PERSON SAME	Selenium	8.75E-05	0.013		No
TOTAL PAH HAPs (Ibihr) *		1.44E+00		1.1	Thalium"	1.03E-06	0.007		. 40
TOTAL Federal HAPs (Ibihr)	100	1.44E+00	12.0		Variadium*	4.77E-05	0.003		140
TOTAL Idaho TAPs (b/hr) =		1.43E+00			Zinc*	1.53E-02	0.667	No.	No

TOTAL Idaho TAPs (b/hr) + a) Reserved.

Facility:

Norm's Utility Contractor, Inc., Rathdrum, Portable HMA

SB, AppB - UNCONTROLLED

3/13/2006 17:31

Permit/Facility ID: P-060100 777-00372

TAPs EL Screening

Yes

Max Emissions of Any Pollutant from Drum Nix HMA Plant with Fabric Filter, Tank Hester, Generator, Load-out/Silio Asphalt Storage
A Drum Nik Plant:

230 Torishour 6.756 Hourstyear 2,190,000 Tonsyear HMA throughput
Maxemum emission for each pollutant from any fuel-our mg opinion selected on "Facility Osta" workshoot

1. Tank Healer:

2.1160 NMED Rated 8.750 Hourstyear 0. Include all emissions from Load-out/Silio Piting
Maxemum emission for each pollutant for healer during only fuel selected on "facility Osta" workshoot

6. Generator:

6. Generator:

7. Hourstyear Small or Lurge Generator using Desail Fuel

D. Include all emissions from Load-outfalo Filling?

SMALL	I BUT	Sonice	Pactor	200	ELST	
esel Fu	el.				0,000	

C. Generator: Poliulant	TOTAL of Max Emission Rates from A, B, C & D (Bulti)	galhour TAPs Screening Enrison Limit (EL) increment <sup>®</sup> (bitr)	TAPs Emissions Exceed EL Increment?	Hours/year	Small or Large Generator using D Pollutant	TOTAL of Max Emasion Rates from A, B, C & D (b/b/)	TAPs Screening Emission Limit (EL) increment <sup>2</sup> (billy)	TAPs Emissions Exceed El. Increment?	Modeled?
				3 3	PAH HAPs	-		12.0	100
			200	70000	2-Methylnaphthalene	2.396-02	10000	- 10	
					3-Meltrylichtoranthrene*	3.738-09	2.50E-06	No	No
				377	Acenaphthene	8.70E-04	1		100
					Acenaphthylene	2.18E-03		5.0	
	= 100	9 9			Anthracene	1.97E-04	200	100	
					Benzo(s)enthrasene	1.045-04			100
	_		3 - 1		Benzo(a);yrene*	4.41E-05	2.00E-06	Exceeds	See POM
HCI.	0.00	0.05	No		Senzo(b)fluoranthene	3.15E-05			7.7
Diexins"		Toxio Equivalency Factor	Adjusted Emission Rate (b/hr)		Berzote pyrene	4.02E-05			
	0.005+00	1.0	0.00E+00		Benzolg 1 (perviene	1.10E-05			-
3.7.8-TCDD	0.00E+00		3.50E+03	-	Benzejk/fluoranthene	1.21E-06			740
Total TCOD	0.00E+00	0.00	0.00E+00	-	Chrysene	2.66E-04	1		
.2,3,7,8-PeCDO	0.00000	0.5	V.40E+00			3.18E-07		335	
Total PeCOD	0.006+00	0.1	0.00E+00		Dibenzo(a,h)anthracene Dichlorobenzene	2.49E-06	1		
2,3,4,7,8+Hc00	0.005+00	0.1	0.00E+00		Fluoranihene	2.90E-04			
2.3.6.7.6-H+CDO		0.1	0.00E+00		Pluorene	2 256-03			
12.3,7,6,9-HvCDD	0.00E+00	n/a	J. 100 E 400	-	indens(1,2,3-sd)pyrene	2.158-06		275	
23.4.8.7.8-Hp-CDD	0.00E+00	0.01	D.00E+00		niaphthalene"	2.47E-02	2.33	No	No
retai HpCDO	D 00E+00	0/4	D.C.C.	-	Paylene	4 00E-05			
Octa CDD	0.00E+00	nla	-	18000	Phenanthrena	3.73E-03		(C) = 1/2	
Total PCDD*	0.00E+00	n/a		0.00	Pyrene	5.42E-04	T		11/65
	GOSE-OF	10.0			PolycyclicOrganic Watter**	4.21E-04	2.00E-00	Escaeda	YES
Furens* 23.7.8-TODE	D DOE +CD	0.1	0.00E+00			12.22	-		
Total TCDF	0.005+00	nia			Non-HAP Organic Compounds				
1.2.3.7.8-PeCDF	0.00E+00	0.05	0.00E+00		Acetone*	2.16E-03	111	No	Ne
2,3,4,7,8-PeCDF	0.00E+00	0.5	0.006+00		Benzaldehyde	0.00E+00		-	
Total PeCDF	0.00€+00	n/a		CAV - 57 115	Butare	1.72E-01			
1,2,3,4,7,8-HxCDF	0.06E+00	0.1	0.005+00		Butyrardefryde	D.00E+00		100	_
1,2,3,5,7,8-HxCDF	0.00E+00	0.1	0.00E+00	0.00	Crotonaldefyde*	0.00E+00		No	No
2 3 4 8 7 6 HeCDF 1 2 3 7 8 8 HeCDF	0.00E+00	0.1	0.80E+00		Etyriene	1.79E+00		-	-
1,2,3,7,8,9-HxCDF	0.005+00	0.1	0.00E+00		Heplane	2.35E+C0		No	No
Total HvC.DF	0.005+00	0.01	0.00E+00		Hexatel Isovaleraldehyde	0.00€+00			-
1,2,3,4,6,7,8HpCDF	0.00E+00	0.01	0.000+00	_	2-Nethyl-1-postene	1.006+00			-
1,2,3,4,7,8,9-HpCOF	0.00E+00	0.01	0.000,100		2-Methyl-2-butene	1.45E-01		-	1
Total HpCDF Octal CDF	0.00E+00	n/a			3-Wathylpentane	4,75E-02		S	
Total PCDF	0.00E+00	n/a	1000		1-Pertene	5.50E-01			
Tetal PCDD/PCDF*	0.00E+00	0/8			n-Pertane*	5.25E-02		No	No
1014	Adjusted	TAPs EL for 2.3,7,8 TODD	Exceeds TAPs EL7	Nodeled?	Valersidehyde (n-Valersidehyde	0.00E+00			No
Dioxin/Furant	0.00E+00	1.50E-10	No		Metals	15		15	
Nen-PAH HAPs	1	TAPs EL		922 0	Antimony"	4 S0E-05			No
Acetaldehyde*	0.005+00	3.00E-03	No		Arsenio*	1.40E-04			YES:
Acrolein*	0.038+00	0.017	No	1 23	Satum."	1.48E-03			No
Benzene*	9.90E-02	8.00E-04	Exceeds	YES	Beryllum*	2.49E-08			No
1,3-Butadiene*	1000	( )		- 2	Catimium*	1.05E-04			YEB
	6.89E-02	28	No		Chromum*	1.38E-03	0.030		No
Ethylpenzene*		5.10E-04	Exceets	YES	Cobart*	6.67E-08			, No
	7.07E-01				Copper*	7.77E-04	0.01	No	140
Formaldehyde*	7.07E-01 2.34E-01	12	No						
Formaldehyde* Hexane*			No		Hexavalent Chromium*	1.136-04		Escends	YES
Formaldehyde* Hexane* Boodlene	2.348-01		No No			1.13E-04 1.93E-03		Escends	No
Ethylbenzene* Fermaldethyde* Hexane* Hexane* Hexane* Methyl Ethyl Kelone* Persone	2.34E-01 1.00E-02	12			Heravalent Chromium*		0.06	Escreds No	
Formaldehyde" Honane" Bood ane Methyl Ethyl Kelone" Pentane"	2.34E-01 1.00E-02 1.70E-03 5.39E-03	12 39.3 115	No		Hexavalent Chromium* Manganese* Mercury*	1.93E-03	0.06	Esceeds No No	No
Formuldehyde" Henane" Hoodene Methyl Ethyl Kelone" Persons" Propionaldecyde"	2.348-01 1.00F-02 1.70E-03 5.39E-03 0.00E+00	12 39,3 118 0.0287	No No		Hexavalent Chromises* Manganeses* Mercury* Volytidenum*	1.93E-03 6.00E-05 2.28E-06	0.06 0.00 0.33	No No No	No No
Formuldehyde* Hexane* tooddane Methyl Ethyl Ketorre* Pentane* Propionaldenyde* Quinene*	2.34E-01 1.00F-02 1.70E-03 5.39E-03 0.00E+00 0.00E+00	12 39,3 118 0.0287 0.027	No No No		Heravalert Chromiuet* Manganesu* Mancury* Volybdenut* Nichal*	1.93E-03 6.00E-05 2.26E-06 1.56E-02	0.06 0.00 0.33 2.70E-0	Esceeds No No No No Esceeds	No No No
Formuldehyde* Hexane* Isoaciene Methyl Ethyl Ketone* Persiane* Propionalderyde* Quinene* Methyl chloratere*	2 34E-01 1 00E-02 1 70E-03 5 39E-03 0 00E+00 0 00E+00 1 20E-02	12 39,3 118, 0.0287 0.027 127	No No No No No		Hexavalent Chromises* Manganeses* Mercury* Volytidenum*	1 93E-03 6 00E-05 2 20E-06 1 56E-02 7 00E-02	0.06 0.00 0.33 2.706-0 0.00	Esceeds No No No No No No No Esceeds No	No No No YES
Formaldehyde" Howard Sood are Methyl Ethyl Kebork Persians Persians Pagionaldedyde Durrene Methyl chlostome Tokkene	2 34E-01 1 00E-02 1 70E-03 5 39E-03 0 00E+00 0 00E+00 1 20E-02 4 16E-02	12 39.3 118 6.0087 6.027 127 25	No No No No No		Herevalent Chamiust* Manganesu* Marcon;* Moybdenum* Neset* Phosphorus*	1.93E-03 6.00E-05 2.26E-06 1.56E-02	0 06 0 00 0 33 2 705-0 0 00 0 00	No No Exceeds No	Mo Mo Mo YES
Formuldehyde* Hosane* Josef Ame Methyl Ethyl Ketone* Pentane* Pentane* Quanene* Methyl chlostone* Tobane* Xylene*	2 34E-01 1 00E-02 1 70E-03 5 39E-03 0 00E+00 0 00E+00 1 20E-02	12 39.3 118 0.0087 0.027 127 25 29	No No No No No		Heravalent Chromited* Manganesa* Manganesa* Viorybdenum* Notest* Pincaphorus* Shior* Selenum*	1 93E-03 8 00E-05 2 28E-06 1 58E-02 7 00E-03 1 20E-04 8 75E-05	0 06 0 00 0 33 2 705-0 0 00 0 00	Escreds No No No Escreds No	No No No YES No
Formaldehyde" Howard  Howard  Mathyl Ethyl Ketorib"  Persional  Duniere  Mathyl chordenyde  Mathyl chordeny	2 348-01 1 00F-02 1 70E-03 5 39E-03 0 00E+00 0 00E+00 1 20E-02 4 56E-02	12 39.3 118 6.0087 6.027 127 25	No No No No No		Heravalent Chromium  Mangunesa  Mangunesa  Voystdenum  Nessel  Phosphorus  Silver	1 93E-03 6 00E-05 2 20E-06 1 56E-02 7 00E-03 1 20E-04	9 06 9 00 9 33 2 70E-0 9 00 9 00 9 00 9 00	Esceeds No No No No Esceeds No	No No No VES No No

HMA Drum Mix Fabric Filter Tookin\_8687 TOTAL TPY & TAPa ELa\_Version C\_62/17/2006 Pages 6, 7

TOTAL Makes TAPs (bibry = 1.43E+96 Enc.\* 2.0567 No.

3) Reserved

5) Tapic AP Politicists, IDAPA 58.01 01.585 and .586, levels in office as of January 27, 2006

() Indician Procedures for Estimating Rabs Associated with Exposures to Reserved and Colorando Disensory-disease and CoPs, 1969-goods, EPAHS 2500 No. 1969 Source Makes Disease Choo, April 2003)

Na - not evaluate: IDAPA 58 01 01 586. TAPS Carcinogenic Incorrenate: Total of adjusted evaluation rates are trained as a single TAP (2.3.7.8 TODD)

(IDAPA 59 01 01 586, Papy-cycle Circums Matter: Emissions of PAHs shown in bold shall be considered together as one TAP equivalent in potency to benzously stress.)

(DAPA Towo Air Politicas, 58 01 01 585 or 595)